

From ab4el.com Tue Aug 9 00:00:00 1994
From: "JEFF M. GOLD" <JMG@tntech.edu>
Subject: ARK 4 sidetone noise

All,

well got a mod in the mail a couple of days ago that is suppose to take care of the sidetone bleedthru... big complaint of some on the net. Well came home and was ready to do it..realized I sent in my parts overlay with the article I finished.. decided to try anyway.. hard locating resistor #s when they are all covered up... took me a while to do the 3 part mod, changing out one resistor, one electrolytic cap and soldering a cap to resistor .(I removed the resistor and soldered the cap to a new one and then soldered that to the board. It is never really easy to unsolder a plated thru board.. thing it took me about 20 minutes for that and one other mod.

NO MORE bleedthru at ALL that I can dedect.

72

Jeff, AC4HF

From ab4el.com Tue Aug 9 00:00:00 1994
From: Scott Wood <swood@Vela.ACS.Oakland.Edu>
Subject: Anyone archive this list?

I am about ready to go digging into my hypertext home pages on the WWW and I was wondering if anyone was keeping a collection of the mailing list anywhere that I could create a pointer to in my page for all those mosaic users out there?

swood

- - -
If you receive this signature, please return it to it's rightful owner:
swood@vela.acs.oakland.edu swood@argo.acs.oakland.edu
swood@unix.secs.oakland.edu swood@terminator.rs.itd.umich.edu

From ab4el.com Tue Aug 9 00:00:00 1994
From: lhalliday@creo.bc.ca
Subject: Re: Buying NP0 caps

Bruce KN6MN asks:

> The VFO has a bunch of caps in series and in parallel, all NP0. There's
> one parallel pair consisting of a 510pf NP0 and a 6-82pf variable, and
> another parallel group consisting of a 220pf, a 30pf, a 12pf, and a
> 1.5-5pf trimmer. Now, I can't find a 510pf NP0 in either DigiKey or
> Mouser. I can make that only by paralleling three capacitors. Is that OK?

Not only can you, it's the right thing to do. By distributing the current among several capacitors you are lessening the amount they heat in operation, and minimizing drift if your capacitors aren't exactly NP0.

73 from Burnaby,
laura VE7LDH

From ab4el.com Tue Aug 9 00:00:00 1994
From: CQC@aol.com
Subject: CQC Low Down Editorial

+++The following editorial will appear in the next Colorado QRP Club newsletter, The Low Down to be mailed before the end of August:+++

Earlier this summer there was a posting on the QRP group on Internet about "20 meters shrinking." The concern was about the loss of the normal c.w. part of the bands to digital and other modes usually higher than 14.070. This is exactly what I have been talking about since the first of the year.

With the huge increase of new amateurs over the last few years, I am afraid that we will lose much of what has been the c.w. portion of the h.f. bands. Do you remember "gentlemen's agreements?" I have nothing against the various digital modes. Lots of QRPers use digital modes. However, I sincerely believe that many, possibly most, of the new amateurs are not aware of the gentlemen's agreements of the past. It is becoming quite common to hear many of them on 14.060 and down to 14.050 and sometimes even below.

The problem is that many of these stations are mostly automated and there is no way for them to hear our requests to QSY. Many of them admit they like the digital modes and do not operate any c.w. I'm not sure they would be able to copy us, if they were monitoring the frequency.

There has been a lot of talk lately about no-code privileges on h.f. No-code privileges would mean an increase in s.s.b and digital modes. If this were ever approved, we would be forced out! Shear numbers would dictate this. Where would they go? Up? Heck no! Down? Sure. There is another 50 Khz above the Extra portion. They say that the c.w. mode is antiquated anyway. Right? Do you see what we could be in for?

If we don't stop the advancement of these operations into the regular c.w. portion of the band and especially the recognized QRP frequency, we will lose it. Many of the typical QRP receivers cannot handle a strong digital station at 14.062.

I have some suggestions. 1) Send a card to these operators notifying them that they are operating lower than the "gentlemen's agreement." If all of the QRP clubs would get behind this, it might make a difference. If we allow them to operate without opposition, they will claim "squatters rights."

2) Petition the FCC for an exclusive low-power c.w. sub-band for General and above. How about 00-10 KHz up on 80, 40, 20 and 15? Yes, reduce the Extra portion. The Extra portion is not fully utilized compared to the rest of the c.w. band. The first 10 KHz would reduce problems with QRM during major DX operations. 3) Petition the FCC for an exclusive digital sub-band. Keep them contained! No digital outside this segment.

I would like to hear your ideas. I think something has to be done before it is too late. QRPers have the most to lose. Our opponents will have a lot of political clout as their numbers grow. I would also suggest that all of us join the ARRL. It is the only national amateur radio organization and it does have a lot of clout with the FCC. We have to monitor what is going on there and be sure our supporters run for and are elected to posts as directors, etc.

72,

Rich High, W0HEP
President & Editor
Colorado QRP Club
The Low Down

+++ Your comments will be appreciated. Reply to: cqc@aol.com
Tnx, Rich, W0HEP

From ab4el.com Tue Aug 9 00:00:00 1994
From: CQC@aol.com
Subject: Re: CQC Low Down Editorial

>
> +++The following editorial will appear in the next Colorado QRP Club
> newsletter, The Low Down to be mailed before the end of August:+++
>
> ... stuff deleted....
> 2) Petition the FCC for an exclusive low-power c.w. sub-band for General
> and
> above. How about 00-10 KHz up on 80, 40, 20 and 15? Yes, reduce the Extra
> portion. The Extra portion is not fully utilized compared to the rest of
> the
> c.w. band. The first 10 KHz would reduce problems with QRM during major DX

> operations.

Why not 00 - 75 KHz on 80, 40, 20 and 15? These bands can get quit crowded at times!

> Rich High, WOHEP
> President & Editor
> Colorado QRP Club
> The Low Down
>
> +++ Your comments will be appreciated. Reply to: cqc@aol.com
> Tnx, Rich, WOHEP
>
>

TJ

- --

Thomas J. Jennings | Tel: (716) 273 7071
Development Engineer | Fax: (716) 273 7262
|
ABB Process Automation |
Post Office Box 22685 |
Rochester, New York 14692-2685 |
|

Internet: jennings@jennings.rochny.uspra.abb.com

TJ:

I was just proposing a "low power" sub-band. I don't think it is realistic to ask for the whole c.w. section especially on 40, 20 and 15m.

Rich WOHEP
Life's too short for \$800 finals!

From ab4el.com Tue Aug 9 00:00:00 1994
From: rdkeys@csemail.cropsci.ncsu.edu (R. D. Keys)
Subject: Re: CWIST for the West Coast!!!

>
> Bob -
>
> I tried both frequencies at the indicated time, and could hear nothing from
> the east, nor did I get any response to my CQ CWIST, from the east or from
> anywhere else.

This week we are going to push 40 meters to see if we can get a bit more coverage.

There are a few folks out on the west coast that have voiced interest. So, do tag along and check the QRG.

>
> I think that you should emphasize that this is a nationwide event, and even
> if the east coast contingent cannot hear the west, local groups can still
> work each other.

I have posted it as a worldwide event.

It is still in its infancy, perhaps, but should pick up well in the winter.

What would be nice is to have the groups in each time zone meet at midnight local time on the appointed QRG's. That way all the locals would be covered and the long haul fellas would be able to check other times for possible QSO.

If it were started at midnight on the east coast, then midnight in the central zone, then midnight in the mountain zone, then midnight in the pacific zone, it would run more as a QSO party rather than any sort of formalized net. I don't want things to be a highly structured net. I DO want things to be a loose informal roundtable to a very informal loose knit net sort of structure. Since folks on the west coast are having trouble getting anyone, start a west coast group at midnight pst (0700utc).

>
>
> Mark
>
> KM6FM
>
>
>
> >If you are interested in the CWIST fellas, then by all means join in.
> >
> >This coming friday, we will also have a 40 meter QRG going (7102.5khz).
> >

> >The response has been good on 80 meters, but this time of year, they
> >only run out to the midwest or so from the east coast. This winter,
> >80 should easily be transcontinental. For now, concentrate on 40 meters
> >if you want to work with the group transcon. If you are interested in
> >getting a group going out on the west coast on 80 meters, keep the same
> >local time of midnight (0700UTC) for the west coast so as not to
> >conflict with the east coast fellas.
> >
> >The gathering should not be construed as a formal net of any sort.
> >It is just an informal gathering of folks interested in CW. As such,
> >it runs like a roundtable discussion. If it has to become a formal net,
> >then it is not really what I was after in getting the thing going.
> >It needs some structure, but is an INFORMAL gathering of like-thinking
> >folks, and not a highly structured formal net.
> >
> >
> >Thanks for your interest, and pass the word along.
> >
> >Bob
> >NA4G
> >

Any other comments from the boatanchorites, the qrpites and any other
net lurkers?

Bob
NA4G

p.s. Did work W0JD/qrp last night from St. Louis on 5 watts, on 40, so
the indications are that 40 could be reasonable. What IS needed is
someone to scout a good 40 meter QRG in the novice band --- any
takers?

From ab4el.com Tue Aug 9 00:00:00 1994
From: Jeffrey Robert Luszczyk <jrl2@cornell.edu>
Subject: Re: CWIST for the West Coast!!!

Hello All,

I like this idea, I've just put up a dipole for 40m in my backyard,
which I can now say is one 40m dipole length. This is something I should
have looked more at before I moved in but it has all worked out though my
antenna isn't as high as I'd like it to be.

See you on 40m.

-Jeff N2TIQ/6

From ab4el.com Tue Aug 9 00:00:00 1994
From: Serge Kazantzev <skazantz@spade.mhs.compuserve.com>
Subject: CWIST: WW event?

Hello up there!
I have been 'listening' to the list for a couple of weeks or so,
and I wish to suggest to Bob, NA4G:
- - to change the time of the event. Midnight East coast local time
is not a good choice if you really want a WW event, midnight UTC seems
better;
- - 7102 kHz is good only for listening here... split is therefore
mandatory.
No, don't worry, for sure it is a US game. Just wanted to remind you
that WW may have a slightly different meaning in other places!
OOOPS! a detail: this message comes from Paris (France in 01'Europe)!
73,
Serge, F6BHK also FM5GC.

From ab4el.com Tue Aug 9 00:00:00 1994
From: "Vinod Narayanan" <vinod@watson.ibm.com>
Subject: Re: CWIST: WW event?

>> - 7102 kHz is good only for listening here... split is therefore
>> mandatory.

I am rank beginner, and I have been planning to check into
this net as soon as I get my antenna up. Since this was set
up to encourage beginners as well as old hands, I would say
that split would be too difficult for the beginners. (There
may be no solution to this since the US 40m novice band may
not be available at all in other countries..)

Just my \$0.02. (or should I use 0.02IRCs ? :-)

- --vinod
email: vinod@watson.ibm.com

From ab4e1.com Tue Aug 9 00:00:00 1994
From: rehm@zso.dec.com
Subject: FYI - Re: Solar Panels

- - - - - Forwarded Message

Date: Wed, 17 Aug 1994 09:02:50 -0700
Sender: Technology Transfer in International Development
<DEVEL-L@AMERICAN.EDU>

From ab4el.com Tue Aug 9 00:00:00 1994
From: dick@kanga.demon.co.uk (Dick G0BPS)
Subject: GB4VE SPECIAL EVENT

Hi Gang, I shall be activating the call GB4VE during the month of september from SE UK, mostly on QRP frequencies and some SSB thrown in. Any sked requests to me via here OK, but daytime (UK) is out for the first week and weekend of 3/4th. I am VERY busy that time. Any requests for sked will be met if at all possible but my CW speed is abt 12 - 15wpm OK slow.... Computer not yet connected HI.... Needless to say the call is "Victory in Europe" 50 years on, special QSLs will be sent on behalf of the "Kanga Gang QRP club"

TTFN

Dick G0BPS / G0R00 A member of the DRAGON SLAYERS QRP Group
Kanga Products (Remember that sometimes the Dragon wins)

[The opinions expressed here are always that of the management,]
[I am the management!! (especially when she lets me)]

From ab4e1.com Tue Aug 9 00:00:00 1994
From: Mike.Czuhajewski%hambbs@wb3ffv.ampr.org (Mike Czuhajewski)
Subject: Good QRP show

We had the QRP Show and Tell at Md Radio Center on 6 Aug as planned. I was disappointed that we didn't get more of the local long-time QRPers than we did, but overall turnout was good. Had lots of new folks, a good sign. We also had W6TOY, who now lives in this area. I had been trying to get him to write a series of beginning QRPper articles for the

QRP Quarterly and he gave me the first few; should turn out to be a good column or ongoing series. Dick, KA3ZOW of S&S was also there. In addition to the obligatory ARK-40 and ARK4, he also brought along his new counter, the PC-1, I think it is. This one has presets (via dip switches) so you can use it with a VFO rig which lacks digital readout, even when the VFO covers an oddball range. He demonstrated it on a couple rigs; nice unit, and he says it can also be used as a regular counter. If there is any interest we may try another QRP show in the winter. 73 and Queue Our Pea de WA8MCQ

- - -

Mike Czuhajewski, user of the UniBoard System @ wb3ffv.ampr.org
E-Mail: Mike.Czuhajewski%hambbs@wb3ffv.ampr.org
The WB3FFV Amateur Radio BBS - Located in Baltimore, Maryland USA
Supporting the Amateur Radio Hobby, and TCP/IP InterNetworking

From ab4el.com Tue Aug 9 00:00:00 1994
From: "Kevin Anderson" <GGANDERSON@Augustana.edu>
Subject: Re: Ingram's book (was Ingram's end-fed dipole -- any users?)

> Hello
>
> I am not familiar with this book. Where can I get a copy or
> can I get it at the library?
>
> Marty kd8bj

Marty, full info on the book:

Dave Ingram (K4TWJ) , How to Get Started in QRP, Redwood,
Wash: NARA (National Amateur Radio Association), 1992,
130+ pages.

I got my copy for \$9.95 at a hamstore (Radio City) in
Minneapolis/St. Paul this summer. You should be able to get
it shipped via VISA/MC by calling NARA at 1-800-GOT-2-HAM
(1-800-468-2426).

Contents (most subsections are just a page or three in
length):

QRP Quick Start

Chapter 1 -- The Fascinating World of QRP
Work the world with QRP? You bet!
Try QRP Tonight
QRP, QRPp, and Milliwatting

Additional QRP Frontiers

The Serious, casual, and just for fun QRPer

Important notes on QRP for new licensees

The magic of QRP

QRP groups and clubs around the world (including a picture of the Rev Dobbs, G3RJV!)

Chapter 2 -- The fine art of operating QRP

getting big results with low power

special tips on QRP DXing and contesting

using propagation effects to your advantage

DXing the HF bands

DXpeditioning with QRP

Chapter 3 -- Commercial equipment for QRP

modifying 100 watt transceivers for QRP

Ten-Tec and the Argonaut legend

The Argonaut II

MFJ-9020 QRP transceiver

The Heathkit HW-7, HW-8, and HW-9

Chapter 4 -- Homebrew QRP: High adventure at low cost

the K4TWJ QRP Pen

KY8I's Michigan Mighty Mite

N4DKD's Four in a Row

the Two Chipper

Expanding your "Peanut Whistle" into a full transceiver

Kanga Kits and the Oner Transmitter

The Oner Transceiver

The QRP Acorn

The Transformerless Wonder

The Tejas Backpacker I QRP Transceiver

Chapter 5 -- Inexpensive stations accessories for QRP

Terrific hand keys

Unique Paddles and Keyers

Microphones and Speech compressors

Antenna tuning items

Clever speaker and earphone ideas

Simple tape recorder trick

Chapter 6 -- QRP-Attractive antennas

The difference between makeshift and good antennas

helpful tips for home-assembled antennas

helpful notes on antenna installation

the classic dipole

the full wave delta loop

the slanted X beam

an end-fed dipoles for condos
the Carolina Windom

Chapter 7 -- VHF and UHF QRP
6 meters and QRP
Operating QRP on 2 meters
70cm QRP? Sure!
QRP via OSCAR Satellites
QRP on 10 GHz

Chapter 8 -- Battery power for QRP rigs
Nickel cadmium batteries and self designed battery packs
a universal nickel cadmium battery charger
a universal nickel cadmium checker
zapping nickel cadmium cells back to life
gel cell batteries
automotive-type lead acid batteries
a new quantum "ham battery": perfect for QRP!

Chapter 9 -- Natural power sources for QRP...and more!
a closer look at solar energy systems
overview of wind power systems
water power systems
cactus and tomato power for QRP
73 and good QRPing to you!

Disclaimers -- I am not a member of NARA (not yet; it is only
\$10 a year), and I've only read their magazine once. I am
not a friend of Dave Ingram (I've never met or QSO'd with
him). I've only read and bought the book at a legitimate
ham store. Realize that the book was published in 1994,
meaning that several things have already changed,
particularly the equipment. Realize that this is primarily
a book for beginners, and so you "experts" and already
experienced QRPers may be bored.

I've enjoyed the book.

Cheers, 73 de Kevin, KB9IUA (just doing a service...)

Kevin L. Anderson, Geography Dept., Augustana College
Rock Island, Illinois 61201 USA phone: (309) 794-7325
e-mail: gganderson@augustana.edu or kla@helios.augustana.edu

From ab4el.com Tue Aug 9 00:00:00 1994

From: "Kevin Anderson" <GGANDERSON@Augustana.edu>
Subject: Ingram's end-fed dipole -- any users?

I was looking at Ingram's QRP book at antenna ideas, not for portable, but for home use. He describes an end-fed dipole using coax that sounds intriguing, as I can imagine running the coax around more easily than trying to put up a "classic" dipole for 40meters (trees aren't otherwise in the right places).

Anybody use this antenna? How well would an end-fed 40m dipole load up on 15m?

He describes the antenna as thus:

1/4 wavelength coax feedline that continues right into an air-wound RF choke (6-inch diameter, ten turns for 40m, 4 turns for 15m), that in turn goes into 1/4 wavelength of coax portion of antenna (the above is all one continuous piece of coax). The center conductor is then connected to a 1/4 wavelength of standard antenna wire which terminates at an insulator.

For 40m, this is about 99 feet of antenna and feedline (about 70 feet of that coax RG-8/U), but I can imagine more easily snaking this up and over the roof and off to a tree, either flat at the end or sloping downward again.

Any users? Any comments? Would I still need a tuner? Thanks.

73 de Kevin, kb9iua

* * * * *
Kevin L. Anderson, Geography Dept., Augustana College
Rock Island, Illinois 61201 USA phone: (309) 794-7325
e-mail: gganderson@augustana.edu or kla@helios.augustana.edu
* * * * *

From ab4el.com Tue Aug 9 00:00:00 1994
From: Brien Pepperdine <pepperb@gov.on.ca>
Subject: Re: Ingram's end-fed dipole -- any users?

As chance would have it, I was visiting a local ham last Monday who is a pilot (i.e . Boeing, Lockheed, Airbus - big planes) and he has flown all over the world. He takes his Icom 735, an MFJ tuner and THAT VERY antenna in an travel case. He puts the antenna out the hotel window and works ham

radio very well. He has done west to east coast across America, and does a lot of European contacts when stopped over. So on most of his trans-continent and trans-oceanic flights he gets some hamming in the majority of nights or days, depending on schedule. He swore by it, having tried very many antennas in his portable hamming career as a pilot. He had tried many, and strongly recommended it to me for portable or camping antenna.

72
Brien Pepperdine
VE3VAW

From ab4el.com Tue Aug 9 00:00:00 1994
From: "Kevin Anderson" <GGANDERSON@Augustana.edu>
Subject: Re: Ingram's end-fed dipole -- any users? (Follow)

> Kevin,
> How many turn choke do you need for 160 meter version
> of the end fed dipole? 40 turns?
> The end fed dipole sound interesting.
>
> Thanks and 73
>
> TJ, kv2x

Could be, Tom. He doesn't give for 160m, but these are the other values (all with a 6-inch diameter):

3 turns	6, 10, 12m
4	15 or 17m
6	20m
8	30m
10	40m
15 turns	80/75m

It's not quite doubling, so I'd guess off-hand maybe only 25 turns or so for 160m. The purpose of the air-wound RF choke, as you can guess, is to separate the end of the transmission line from the antenna.

He goes on further to suggest a strain-relief loop at the point where the coax and wire portions of the antenna meet, and to calculate lengths by NOT factoring in the acceleration factor, so just use 234 ft / F in Mhz. In your case, about 85m of coax (need some for choke) and 40m of

wire. "Tuning" for low SWR is by moving the choke back or forth, one turn at a time, and not by trimming any wire.

Supposedly makes a great, light portable (Ingram labels this antenna as an apartment/condo antenna), that you roll-up to take home.

73 de Kevin, KB9IUA

Kevin L. Anderson, Geography Dept., Augustana College
Rock Island, Illinois 61201 USA phone: (309) 794-7325
e-mail: gganderson@augustana.edu or kla@helios.augustana.edu

From ab4el.com Tue Aug 9 00:00:00 1994
From: James Lyons <jlyons@CAM.ORG>
Subject: Is anyone out there?

I don't seem to be getting the QRP mail anymore. If anyone reads this perhaps they could let me know ewhat is going on. I can't live much longer without my QRP "fix".

72, Jim, VE2KN

PS. you'll have to Email me!

From ab4el.com Tue Aug 9 00:00:00 1994
From: janderson@polycom.com
Subject: Looking for diode

I'm repairing an HP 3310A Function Generator, and am having a tough time finding a part that I need.

The part is a 1N3713 Tunnel Diode. I've traced some waveform distortion problems to this part, and I'd like to replace it. HP no longer supports this product (manufacturing stopped in '85, and support ended in '90), and no longer have this part in stock.

I've talked to one manufacturer already, and they want \$20.00 each(!), 3 piece minimum. I'm not sure that the distortion is severe enough to warrant \$60.00, and I'd like to do some

comparative shopping before I buy. The problem is, I haven't found these anywhere else.

Does anyone have any of these in their junkbox, or know of possible sources to try? I've tried the surplus houses out here in Silicon Valley, as well as a number of distributors. No luck so far...

Thanks for any help.

- Jeff, WA6AHL

From ab4el.com Tue Aug 9 00:00:00 1994
From: prvalko <prvalko@vela.acs.oakland.edu>
Subject: NN1G rig... SUCCESS!!!

Hey gang! You wouldn't believe it but I "fixed" my Dan's Small Parts and Kits, NN1G 20M qrp rig! Works FB, as they say... although I won't stamp it approved until I get a QSO :-)

Seems the silk screener left off a component on the PCB... I knew the board had some spare holes drilled into it... but this one needed a .01mf cap to feed some signal into the base of the first driver transistor :-)

=paul= wb8zjl

"dem holes, dem holes, dem em-ty holes..."

From ab4el.com Tue Aug 9 00:00:00 1994
From: prvalko <prvalko@vela.acs.oakland.edu>
Subject: Re: NN1G rig... SUCCESS!!!

On Tue, 16 Aug 1994, prvalko wrote:

>
> Hey gang! You wouldn't believe it but I "fixed" my Dan's Small Parts and
> Kits, NN1G 20M qrp rig! Works FB, as they say... although I won't stamp
> it approved until I get a QSO :-)

Stamp it **APPROVED**!!! Just worked KD4WIM in Greensboro, NC. Ed had a big signal up here in Mich, 599... he gave me a 579 and I'm happy.

73 =paul= wb8zjl

From ab4el.com Tue Aug 9 00:00:00 1994
From: COAKLEY@PORTLAND.CAPS.MAINE.EDU (Bob Coakley)
Subject: NP0 capacitor combinations

Bruce KN6MN asks about combining capacitors to get desired values in the W7EL VFO circuit. In my experience, you won't get into any trouble doing just that. Also, you may have a little room for different values and still get a useful tuning range. You could probably substitute a 33 pf for the 30 pf and never know the difference. Also, you might get away with a 470 pf instead of the 510 pf - just leave a little room to add another parallel 47 or 33 pf later if needed to get the desired tuning range. A little bigger trimmer and a little less fixed capacitance might also help. I have made several VFOs from junk box parts and have always had a lot of capacitor juggling to get the right range, and the results have always been satisfactory.

Good luck.

Bob KX1E

From ab4el.com Tue Aug 9 00:00:00 1994
From: bruce.florip@amail.amdahl.com
Subject: Re: Need TenTec 'Power Mite' inf

Hi Brad,

With all of the Power Mite activity, I got one of mine out last night to see if it was as bad as some recent comments made it sound... Well, let me just say, I won't dispute the comments.

I was on the air "DX" on 20 meters with the PM3A for about an hour. Let me see... Santa Clara, Ca. to Redwood City, Ca. That must be nearly 50 miles.

I guess I won't submit that one to Chuck for the 1000 mi./watt award !

Anyway, it was great fun, and yes I could hear some nice tunes from local AM stations during the QSO. Oh, and yes even with a TenTec power supply there was some hummmmmmm... Oh, and when the TX to RX and RX to TX change occurred, there was a fairly noticable (not quite painful) click in the phones.

I did truly enjoy the discussion of the HW-8 he used to have, and the signal reports to allow me to tune for no chirp... The subject of how fast 14, 15, or even 20 years can go by when your hamming was mentioned, but we quickly

avoided that subject!

My suggestion is to get out your HW-7s, 8s, and 9s, Atlas TX/RX 110s, and PM radios and enjoy yourself, I did!

By the way, How many of us have multiple HW7s, or 8s, or 9s? If memory serves me... 2 7s, 3 8s, and 2 9s... :) hmmm maybe I'd better get checked... oh, and 1 PM2b, 1 PM3a... I had better stop, until I've confirmed that the rest of you are as bad as I...

73, Bruce

baf00@amail.amdahl.com

From ab4el.com Tue Aug 9 00:00:00 1994
From: "SLRC1::M405142" <M405142%SLRC1.decnnet@mdcgwy.mdc.com>
Subject: Need TenTec 'Power Mite' information

Just procured (!) a TenTec 'Power Mite' xcvr, serial rubber stamped 1850. 80, 40, 20 meters, sliderule VFO / xtal.... Is this a PM-1? THX -N0XEU(Matt)

From ab4el.com Tue Aug 9 00:00:00 1994
From: Brad Mitchell <bmitchel@CBA.Kodak.COM>
Subject: Re: Need TenTec 'Power Mite' information

Cool! I think Paul, wb8jzl or is it zjl,,,,,, hmm I'm confused I think he's typed it both ways on occasion.. :-)
anyway, he knows the most about them. Congrats on the aquisition!
It's not a pm3 or pm3a, they are 40 and 20 meters, or at least mine is.. must be PM2 or 1,,,,,
73
Brad WB8YGG

From ab4el.com Tue Aug 9 00:00:00 1994
From: bruce.florip@amail.amdahl.com
Subject: No TenTec Email address...

Hi Bob,

When I called TenTec trying to get information on the their line of new kits, the guy I talked to didn't know what the internet was... I tried to explain about this group, and that they would probably get a good idea about what type of products the qrp/ham community wanted by at least reading it. I think his response was that they were not that high tech yet...

The good news was that by phone they seemed more than happy to answer questions, and provided honest answers. Bruce baf00@amail.amdahl.com

note: for Doug and others that pay by the line, no long signature...

From ab4el.com Tue Aug 9 00:00:00 1994
From: adams@chuck.dallas.sgi.com (chuck adams)
Subject: NorCal Afield

Jeff and the NorCal Club,

K5FO, aka Chuck, NorCal #40 will be operating from TX, where it will be toasty and probably wet. Was gonna get on last night (really) and the thunderboomers came rolling in. Sparks on the 40M long wire have just got to be seen to be appreciated.

dit dit
Chuck Adams K5FO CP-60
adams@sgi.com

From ab4el.com Tue Aug 9 00:00:00 1994
From: "SHEPARD,PHIL" <pwshepar@mg.sp-eug.com>
Subject: PROM Programmer for sale

Hi gang,

I've got a EPROM programmer that is looking for a new home. It is made by Needham's Electronics and is a plug in card for an Apple II computer. It has a long extension cable that brings the ZIF socket out well away from the computer. It programs 2716 to 27512 family EPROMs. Original cost was about \$110. I'd like to get \$25 OBO.

73,

Phil Shepard
NS7P
QRPP with HW-7, HW-8, Argonaut 505
QR0 by Kenwood

phils@sp.eug
(503)683-5701x3320 work
(503)935-3124 home

From ab4el.com Tue Aug 9 00:00:00 1994
From: K7YHA@aol.com
Subject: QRP Vol-I & II

The following have been sent out as of 8-12-94:
WA5EWHN & Tim Povlick - Vol-II

KG0NR, KB0LRB, KE6GPL, AB5SEU, WA6HHQ, W5LGO, AB6NZ, KB0LMQ, WA6AHL - Vols -
I & II

Still have a quantity of both volumes available:

Vol-I \$15
Vol-II \$20
Both Vols: \$30
Autographed (of course)

Send to Rich Arland, K7YHA
25 Amherst Ave
Wilkes-Barre, PA 18702

72 es 73
Rich

From ab4el.com Tue Aug 9 00:00:00 1994
From: mvjfm@mvubr.att.com (James M Fitton +1 508 960 2577)
Subject: QRP-AFIELD

A QRP-NE group is planning to operate "QRP AFIELD" from
Salisbury Beach, MA, or the nearby NH, or ME, seacoast.

Bring your sleeping bag, and party on Fri. evening (9/16).

If you are interested ; RSVP !

Jim, W1FMR

From ab4el.com Tue Aug 9 00:00:00 1994

From: Jeff Jones <jeffj@crl.com>
Subject: Random wire tuner?

I was looking through my antenna handbook and realized there wasn't a random wire tuner shown in it. I have seen them in the past but for the life of me I can't remember exactly what they looked like or how they were constructed. Could some kind QRP soul do a ascii art or a explanation? Thanks and 72!

Jeff

From ab4el.com Tue Aug 9 00:00:00 1994
From: rdkeys@csemail.cropsci.ncsu.edu (R. D. Keys)
Subject: Re: Random wire tuner?

>
> I was looking through my antenna handbook and realized there wasn't a
> random wire tuner shown in it. I have seen them in the past but for the
> life of me I can't remember exactly what they looked like or how they
> were constructed. Could some kind QRP soul do a ascii art or a
> explanation? Thanks and 72!
>
> Jeff
>
>

Jeff, and any other QRPers and Boatanchorites.....

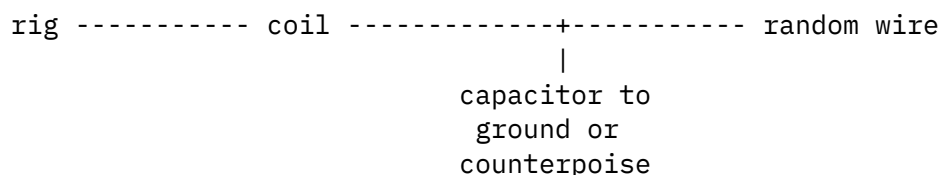
My best results for tuners are as follows:

1. For 1/4 or odd multiple 1/4 wave antennas (lo-Z):
 - a) use a series coil and capacitor cut to suit the band.
 - b) use a pi-net tuner.
2. For 1/2 or even multiple 1/2 wave antennas (hi-Z):
 - a) use an L-net tuner (series coil with a shunt cap on the antenna side).
 - b) use a pi-net tuner.

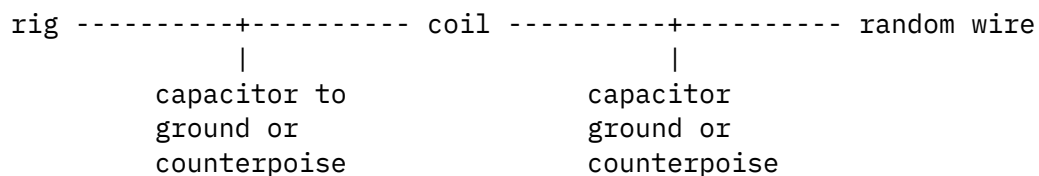
BASIC SERIES TUNER: (lo-Z)

rig ----- coil ----- capacitor ----- random wire

BASIC L-NETWORK TUNER: (hi-Z)



BASIC PI-NETWORK: (unknown-Z)



Note: The capacitors are usually variable, but don't need to be. (Variables are preferred, although close approximations from the junk box switched in gang are fine if relatively close).

Note: The coils are usually variable, but don't need to be. (Roller inductors or tapped coils or a precut coil/band are fine.)

Note: The best of all possible worlds is the pi-network tuner with a series tuner in the antenna side outboard of the pi-net. It will give very good harmonic suppression if properly set up.

Note: Tune the antenna for maximum field strength on a field strength meter. DO NOT USE AN SWR METER, since SWR is meaningless on an antenna fed directly, in terms of feeding it. Your indication of maximum power transfer (match) to the antenna is maximum field strength.

Note: Remember the basics of wavelengths for the length of wire you are using so that you choose which tuner to use for which wire on which band. IS THE FREQUENCY YOU WANT TO WORK WITH THE WIRE YOU ARE USING A HIGH or LOW IMPEDANCE FEED. Choose the appropriate tuner for

the appropriate feed impedance. Keep it simple and it works!

My favorite antenna for 80 meters or 40 meters is a more or less vertical wire up to a tree 65 feet long for 80m or 32 feet long for 40 series tuned. I have used it with a simple coil and variable capacitor since my novice days. You don't need fancy stuff. Bell wire and some plastic will work just fine. My mentor, N1KW, used two foot square aluminum plates mounted on the wall with a plastic sheet in between and a coil airwound out of heavy ground wire, during his college days, and it worked absolutely magnificently mounted up on the wall of the shack. A dowel was cemented to the aluminum plate with epoxy to act as a handle to move it across the fixed plate.

Such an antenna works quite well all over the US on QRP or QRO. My current antenna is just this sort of antenna, and folks can hear me QRP easily to the midwest and beyond, and QRO all over the world.

I contend that any newbie on the hamradio block can put one together for under 5 bucks after perusing any hamfest or for free by hitting up an elmer or two for a variable cap of some sort and a few feet of wire.

Good Luck....

Bob
NA4G

```
*****
* 73 TU SU SK DE NA4G          ``Boat Anchor Bob'', an ol' CW fart. *
*****
* Morse has been in the family for over 100 years.                      *
* Morse radiotelegraphy (Spark/CW) has been in the family since 1914.  *
*****
* May you have fair winds and following seas on your watch at the key. *
*****
```

From ab4el.com Tue Aug 9 00:00:00 1994
From: rdkeys@csemail.cropsci.ncsu.edu (R. D. Keys)
Subject: Re: Random wire tuner? etc, ad nauseum

> Bob Keys writes to boatanchors:

>
> >Note: Tune the antenna for maximum field strength on a field strength
> > meter. DO NOT USE AN SWR METER, since SWR is meaningless on an
> > antenna fed directly, in terms of feeding it. Your indication of
> > maximum power transfer (match) to the antenna is maximum field
> > strength.
>
> Bob is absolutely correct in saying that SWR, in and of itself, is
> irrelevant in the case of a directly fed antenna. But, an SWR
> meter does more than just measure SWR. It also gives an indirect
> indication of the impedance that is presented to the transmitter.

It can be used for that, as can the field strength meter, or an RF ammeter.

>
> If the SWR meter is designed for, say, 50 ohms, the meter gives an
> indication of how far the load the transmitter is seeing varies
> from 50 ohms.
>
> At an indicated SWR of 2:1, we might assume that the transmitter
> will be looking into an impedance of 25 ohms or 100 ohms.
> If the transmitter output circuit is capable
> of tuning any load impedance within the range of 25 to 100 ohms,
> an indication of
> 2:1 or lower on the SWR meter tells us that the transmitter should
> be comfortable with the load, and that the load will not cause
> voltages in the transmitter output circuit to exceed the relevant
> component ratings.

Mostly a rice box phenomenon, not well known among boatanchors.

>
> Thus, I think it important to add one qualification to Bob's statement
> that field strength is the only issue. It is the only issue *so long
> as* maximum field strength can be achieved without presenting a load
> to the transmitter output circuit that runs a risk of falling outside
> the circuit's design limits. Bob, do you agree?

I basically agree, but still contend that on zero length feedlines
swr is meaningless, and the way to tell maximum power transfer (best
match to any given generating device --- modern or boatanchor) is to
use an rf ammeter or a field strength meter. Most hams don't have
proper rf ammeters available, but any ham with a junk box with a couple
of 1N914 diodes and a 10-1000 microamp dc ammeter can throw together
the world's simplest field strength meter --- two diodes and the meter
and get a good indication of what is ACTUALLY GOING OUT INTO THE ETHER.
(Gee that is an ancient boatanchor term, for sure). I teach the kids
in our hamradio classes just how easy it is to make these tuners and these

```

      1N914 diodes
-----|
meter | +-----| \ | / |-----|
      |          | \| | \| |
      |          | / | \ |
      |          | \| | \| |
      |          | +-----+-----+-----+-----+
      |          |          | \ | / | |
      |          | +-----| \| | \| |-----|
      |          |          | / | \ |
      |          | +-----| \| | \| |-----|
      |          |          | / | \ |

```

On riceboxes and transistor rigs needing a strict 50 ohm load, you need to present that load to the transmitter. That is what the antenna tuner is doing. Even then, at maximum load transfer, you have matched the design impedance to the rig. So, even within modern ricebox requirements, there is no need to measure the swr if you are transferring the maximum power to the antenna, by definition you have matched the design impedance of the rig. There are a few situations where that can get you into a bit of molasses. I will illustrate further later. They stem from odd lengths of feeder and antenna presenting some really wierd values to the transmitter. Rice boxes are nil capable of handling such complex impedances, although the BA rigs are quite good at it. That is why MFJ sells so many bloody antenna tuners, right?

I do run an swr meter on my ricebox, but only on long transmission lines (my 40 meter ground plane for instance). On short transmission lines, my swr meters tend to lie a lot (call it rf in the shack), hence, I don't really trust what they are saying, at all. The field strength meter when peaking out tells me that I have maximized load transfer to the antenna. It does this regardless of any stray rf floating around in the shack. This is because rf feedback in the shack as stray rf is due to only a few percent of the total rf AS LONG AS THE METER WAS PEAKED. When the meter is peaked, the antenna/feed system has been tuned for maximum power transfer. At that condition, both the SWR are minimum and the rf out the antenna system is maximum. The impedances presented to the rigs are optimized to approximate the rig design values. Within general design specification of the ricebox, that usually comes pretty close to a 2:1 or less swr. There are exceptions as

for example if you are trying to load into a low impedance antenna with a high impedance tuner or viceversa. Then the ricebox shuts down rather quickly, and swr that it thinks it sees is the culprit.

If one follows the logic of the tuners I mentioned and the type of antenna recommended, then one can see that the need for particular care in swr measurement is minimal. The only case this could be a problem is with a pi-net tuner and some really random wire that was somewhere in the middle between a high and a low impedance feed. There, an swr bridge may be of value. For the series tuned antenna of odd $1/4$ wave lengths, I still contend the swr bridge is unnecessary. Likewise for the even $1/4$ wave lengths with a shunt tuner (L network).

As an experiment, try a 65 foot roll of bell wire with a series cap of 250 pf and a coil of about 1.5 inch diameter wound with say 25-30 turns of bell wire, worked against a 65 foot counterpoise or a good ground on a frequency of somewhere in the 80 meter band.

What have you got? My experience tells me you have a dipole with a zero length feed line and the shack in the middle. Hence, the feed will be a standard low impedance very close to the required 50-70 ohms. The impedances will not be particularly complex, hence the field strength meter will work fine as an indicator of minimum swr.

As a second experiment, try two rolls in series on the same frequency. Ground the output side of the capacitor and move the antenna to the middle junction of the coil and the capacitor. Use the same ground and/or 65 foot counterpoise. What have you got? Me experience tells me you have an end fed fundamental wave antenna (still a dipole, but fed now at the end) with a zero length feed line and the shack on the end of the dipole. Using the L network, the impedance of the antenna will be high, but the impedance on the end of the coil attached to the rig will be low (again within the design specs of most 50ohm rigs since the output circuit is shorted to ground internally in the transmitter for rf either by a torroid or a high value capacitance). Again, the simple field strength meter, when peaked will give you a good indication of acceptably low swr.

As a third experiment, try the pi-network tuner with 1.5 rolls of the bell wire (about 100 feet). Here the antenna represents some complex impedance that could be somewhere between 50 and 5000 ohms. In this case, the field strength meter may tell you that you have maximum power transfer to the antenna when it is peaked, but the swr may be somewhat high or somewhat low, depending upon what impedance transformation you have rolled into the pi-network tuner controls. Here is where an swr bridge may be useful. In the first and second examples, nah, not really, in my experience.

>

> Here, by the way, is another area where boatanchor transmitters
> shine. Many BA's have output circuits that were not based upon the
> assumption of a coaxial cable feedline having a low SWR.
> BA output circuits very commonly are comfortable with a wide range
> of load impedances. My little Johnson Navigator, for example,
> had, as I recall, the ability to tune
> loads of 25 to *600* ohms. It was wonderful in that respect.

WELL SAID!!!!

Few folks realise that good boatanchors will indeed tune the bed springs.
Why.... well the designers had the good foresight to build the antenna
tuner into the rig in the form of the usual pi-network in amateur gear
or the wonderful built-in tuners in the military gear. Score 1 for
boatanchors and 0 for rice boxes.

>
> Try a 600-ohm load on a ricebox, even a ricebox with the expensive
> automatic antenna tuner. Chances are the ricebox will not be happy!

Again, well said. The tuners I have seen on the kenwoodies are nice
but again they will only roll into coax feeds. Heaven help the fellow
that needs to load open wire without an additional outboard tuner or
a big round donut of funky grey rock (called a 9:1 or a 12:1 balun).

>
> --
> 73 de Bob, K0KR
>

Interesting discussion. Finally some real meat to chew on, on the net!

73
Bob
NA4G

From ab4el.com Tue Aug 9 00:00:00 1994
From: teda@meaddata.com (Ted Albert)
Subject: Re: Random wire tuner? etc, ad nauseum

> > Here, by the way, is another area where boatanchor transmitters
> > shine. Many BA's have output circuits that were not based upon the
> > assumption of a coaxial cable feedline having a low SWR.
> > BA output circuits very commonly are comfortable with a wide range
> > of load impedances. My little Johnson Navigator, for example,

> > had, as I recall, the ability to tune
> > loads of 25 to *600* ohms. It was wonderful in that respect.
>
> WELL SAID!!!!
>
> Few folks realise that good boatanchors will indeed tune the bed springs.
> Why.... well the designers had the good foresight to build the antenna
> tuner into the rig in the form of the usual pi-network in amateur gear
> or the wonderful built-in tuners in the military gear. Score 1 for
> boatanchors and 0 for rice boxes.
>

Let me jump in and confirm the BA stuff. My old WRL Globe Scout 680A has a page in the manual devoted to setting up antennas. One option is 80' feet of wire plugged into the coax connector using a banana plug. The pi-net tank circuit has two 365 pf variables. The manual warns that this option doesn't help with harmonic attenuation. I ran this configuration for a time against a simple ground on 80 and 40 meters. A field strength meter was used to confirm max RF while dipping the plate. I made plenty of contacts with my 5 xtals.

I have experimented with other configurations, like a big picture frame window screen, and the pi-net on the Scout always let me load up. I still use that rig on 75/40 AM with an end-fed wire and the little MFJ tuner for random wire antennas.

The fellow who helped me set up the Scout 23 years ago recommended running the least amount of grid drive, dipping the plate, and light loading. He assured me that would give me a chirp free signal and running the lower power wouldn't hurt my operating a bit. (He was right - that advice is still good advice after all these years).

Enough of the nostalgia, back to the pros/cons ... this is a great discussion thread.

73 de Ted, KF8EE

From ab4el.com Tue Aug 9 00:00:00 1994
From: Mike.Czuhajewski%hambbs@wb3ffv.ampr.org (Mike Czuhajewski)
Subject: Re PM3, HW7, etc

For the newer folks out there, the PM3 as well as the HW-7 (and lots of homebrew rigs of the day) had terrible receivers. One of the problems was severe AM detection, among other things. The state of the art in

direct conversion receiver design was not as advanced as it is today, and the main problem is that all of those rigs used a dual gate MOSFET as the mixer. It was eventually learned that this is not the way to do it; by using a doubly balanced mixer, such as the MCL SBL-1, SRA-1, etc, or homebrew equivalent, you get much better performance. (You also suffer a bit of conversion loss, which the MOSFET--or an NE602--does not have, but that can be made up later.) Recommended reading is the original QST article by Lewallen on his optimized QRP xcvr, Aug 1980, I think (not the ARRL handbook version--I think it left out the pertinent details); he describes the reasoning behind the use of the DBM. Another good one is by Denton Bramwell, K7OWJ, in the QRP Quarterly back in 1986 or 1987, in an article on a high performance direct conversion receiver. I own three HW-7's, one of which will never be modified, in order to show people how the basic design worked, with warts and all. I put a DBM into one of them (modifying the original MOSFET circuit from a mixer into a VFO amp per KN1H's article on the HW7 in the QRP Quarterly in 1987 or so); although I used a SAM-2 mixer because it was on hand, it's essentially identical to the SBL-1 as far as we're concerned. The results were quite dramatic, and receiver performance was much better. For about 6 years now I've been swearing I'd update and rewrite the Collins article for the benefit of the new folks--people still pick up unmodified HW-7's all the time--and maybe some day I'll do it. The bottom line is that if you have one of those old rigs with a MOSFET as the mixer and want to use it on the air with better performance and don't mind modifying it, replace the MOSFET with a DBM. 73 and Queue Our Pea DE WA8MCQ

- - -

Mike Czuhajewski, user of the UniBoard System @ wb3ffv.ampr.org
E-Mail: Mike.Czuhajewski%hambbs@wb3ffv.ampr.org
The WB3FFV Amateur Radio BBS - Located in Baltimore, Maryland USA
Supporting the Amateur Radio Hobby, and TCP/IP InterNetworking

From ab4el.com Tue Aug 9 00:00:00 1994
From: xenolith@halcyon.com (Kevin Purcell)
Subject: Re: Re PM3, HW7, etc

>For the newer folks out there, the PM3 as well as the HW-7 (and lots of
>homebrew rigs of the day) had terrible receivers. One of the problems
>was severe AM detection, among other things. The state of the art in
>direct conversion receiver design was not as advanced as it is today,
>and the main problem is that all of those rigs used a dual gate MOSFET
>as the mixer. It was eventually learned that this is not the way to do
>it; by using a doubly balanced mixer, such as the MCL SBL-1, SRA-1,
>etc, or homebrew equivalent, you get much better performance

>Mike Czuhajewski, user of the UniBoard System @ wb3ffv.ampr.org

The suprising things is that this was known when the HW-7 was designed!

Going back to Wes Hayward's' (first?) article in QST in 1965? in which he showed how a simple diode ring mixer with a 1 FET VFO and a few transistor high gain AF amp could give excellent performance.

This article was recently reprinted in QQ so you don't have to hunt down the old QSTs.

Around the time that the HW-7 was designed the 40673 was pretty trendy with a lot of simple single balanced mixers. Hell, they could have made an balanced mixer with 40673 and got much better performance!

But I suppose the awareness of large signal problems hadn't sunk it yet (even though folks like DeMaw and Hayward had already started along that path).

Kevin Purcell, N7WIM / G8UDP
Seattle dBug Mac Developers SIG leader (email me for details)
xenolith@halcyon.com
(206) 649-6489

From ab4el.com Tue Aug 9 00:00:00 1994
From: rdkeys@csemail.cropsci.ncsu.edu (R. D. Keys)
Subject: Re: Re. PERIOD MODIFICATIONS

>
> Hey, I used to use a BC-375 myself. Of course it was pretty heavily modified,
> the MO 211 taken out and replaced by, as I recall, and 807 or 1625 that
> was driven by my Heathkit VFO. No, actually I think it was a two-tube
> mod that originally made the rig xtal controlled so I could use it for
> the CAP, and later applied the VFO for ham use.
>

I ran a BC-375 on field day last year (commemorating the 60th anniversary of the first field day) on 80 meters. It was 100 percent stock, except for having to run it QRP mode because of not having the original 1000V dynamotor (only had a 400 volt one). Running 5 watts output (that was all I could get from the dynamotor I had to cobble together) I managed to work over 100 qso's from midnight to dawn. It was great fun reading the code from the clanking of the relays as you were running the bug at speed. Ahhhh, them were da days.....

Mebbee this winter I will fire up the beast again on the CWIST Friday Night Fist Function.....

73
Bob
NA4G

p.s. Also, the beast is entirely stable on 160/80 meters, contrary to the ancient post-war horror stories from the CQ and 73 mags. Above 80 meters, those horror stories are entirely TRUE. It IS unstable mable above about 5 mhz. But, with careful setup and PROPER neutralization, biasing, and tuning, it sounds just as good as any tube VFO driven transmitter of the 60's.

From ab4el.com Tue Aug 9 00:00:00 1994
From: rdkeys@csemail.cropsci.ncsu.edu (R. D. Keys)
Subject: Re: Re. PERIOD MODIFICATIONS

>
> to: boatanchors@gnu.ai.mit.edu
>
> Well, everyone seems to be getting in their two pfennigs worth about gear
> modification, so I'm gonna take MY kick at the cat too.

A kick at the cat you are entitled to.... Next....

>
> With military surplus boatanchors I guess it all boils down to asking one
> simple question: Do you wanna run a ham station, or a museum? In a lot of ways
> it's not really practical to do both.

It is worthwhile to consider both.

1. If the military piece or boatanchor piece is in museum quality condition, PLEASE DO NOT MODIFY IT.
2. If the unit is in poor or low museum quality condition, but is eminently usable, then that is another story entirely. BUT, if it be a particularly rare piece of equipment (e.g., an old shipboard IP-501A receiver, as an example) check around before you butcher it more than it is. The IP-501 could be worth several hundred to several thousand dollars, depending upon condition. Enuff, said, just use common sense, or if you don't know what something is --- find out before hacking away.

>
> Case in point, the BC-375 and BC-191. These rigs are pre WW-2 designed rigs
> that were used as the main transmitter aboard the B-17 bomber.

This is a wonderful rig. Follow along.

>
> Aesthetically, the rig is pretty neat. However, the design is such that if
> you were to try to run one on the ham bands today the boys at the Grand Island
> Monitor would be on your case in about 30 seconds flat, and they'd push
> for the death penalty! This old war horse emits such a broad, unstable signal
> that if you heard one you'd no longer wonder why so many war surplus receivers
> had an IF selectivity curve you could drive a truck through!

Entirely wrong. BOGUS. No flames intended, but check your reality, please.

All you have to do is to know what you are about, know what the rig is, and know HOW to make it run properly, and what its real limitations are.

Case of the BC-191-BC-375.....

The design of the BC-191/BC-375 series transmitters hails from the early 1930's with an aircraft design by RCA for commercial airline use. The RCA design used a 211 oscillator, a 211 final, and one 211 modulator driven by a type 10 audio driver. It ran the standard aircraft freqs of the time of about 2-5 mhz. It did not have any plug in tuning units but WAS an almost exact precursor to the GE designed BC-191/BC-375. Although GE is not reputed to have ``stolen'' the design from anyone, it was quite common practice in those days to purchase a competitors' rig and tear it apart to see what it was all about. The RCA design hails from about 1932, and is shown in the classic 1935 book by Duncan and Drew (title not remembered, right off). The GE designers in my opinion obviously had a look at the RCA rig because the schematics are essentially identical, and the GE design came out about 3 years later, in 1935. GE won the government contract, though and that is what counted. So, for the next 10 years or so, GE made the behemoth and several variants. What GE designers did was to package the thing in a slightly more ruggedized military style box, and since the military was interested in a broader range of frequency coverage than the airlines, they added the convenience of plug-in tuning for narrow ranges of tuning. The one thing that GE did do was to add a second modulator tube to increase the plate modulation from perhaps 50% to more like 90%.

The signal emitted by the BC-191/BC-375 is as pure a CW as your kenwoodie. The signal is not any broader than any other CW signal. I have no practical experience with it on AM other than to have fired it up on AM a couple of times on 160 meters. It seemed just like any other AM signal.

With the frequency range of the transformers at about 4 khz, my guess is that the signal on AM is some 6-8 khz wide, no more, and that is about right for military gear of the period. They were not really known for wide band AM with the carbon microphones of the period.

Most properly aligned military receivers of the period, such as the BC-342 or the BC-348 (the ones with which the transmitters were used) had generic bandwidths of about 6 khz. The BC-348 was a bit wider, because it had a 915khz if rather than the 460khz if of the BC-342. No trucks need to drive through that particular bandwidth.

>

> The BC-375 isn't unique in this regard; it is simply representative of the
> state of the electronic art when it was designed. In fact, even tho the set was
> built all through WW-2, EVERYBODY knew it was hopelessly obsolete by the time
> Hitler tool Poland! It hung in until 1945 only because it was a design that was
> ready NOW, and for which production lines were already in place.

The design philosophy of the unit was based upon 1935 design philosophy. It was obsolete by 1937 in the strictest sense, since things were rapidly changing in the late 1930's.

The requirements were for a rugged transmitter that would put out about 50 watts of CW and 25 watts of AM, and be cheap and expendable. It filled that requirement quite well. Remember that it was used in most all of the large US aircraft from prewar to the end of the war (this included all of the B-17s B-24s, and many more). It was the standard HF set in preference to the ARC-5, because so many of them were built. The ARC-5 gear came a few years after, but was generically smaller and equally as good signal-wise, but by then, the HF gear was not really in much use, since the Germans intercepted it. The VHF gear was rapidly becoming the mode of operation for plane to plane and ground to ground communication. By 1943 the BC-375/BC-191 gear was beginning to be just along for the ride in the air, and on the ground, most local communications were going to low VHF FM in tanks and the like. Also, ground installations were beginning to use the BC-610 in larger numbers as the long-haul rigs.

The BC-191 was also used in many ground portable installations and in many vehicular installations. Until the late war designs such as the BC-604/605 which replaced the vehicular installations, or the ART-13 design which replaced the aircraft installations, it was the basic 100 watt rig of the Army (ground and air corps).

The design was old, but it was entirely practical, eminently usable, and easily field servicable. To that end, it worked rather well. Also, stability was not much of a problem on the lower bands below 5-6 mhz where it was mostly used. It was also used on MF and the

tuning units for those frequencies can occasionally be found. It was not often used on frequencies of 7-12mhz, from what snippets of information I have heard from others. Even then, on AM it was entirely adequate for the period, and probably not far off of what is usable today. The frequency control requirements for AM are not very strict. On CW, that is a different matter. Above 5 mhz, the beast does chirp unless run on a regulated laboratory HV supply.

>

> At the end of the war even us lowly hams turned up our noses at it; a few
> folks hacksawed the rig in half, scrapping all the RF circuits and saving the
> audio stages to use as a modulator. Most people just considered the rig a good
> source of parts.

Most hams turned their noses up at the BC-191/BC-275 because of some very poorly done articles in ham mags that gave it a bad rap. The hams tried rather unsuccessfully to modify the rig rather than run it stock. It was difficult to get 28VDC in those days for running the filaments or even 12VDC for the BC-191, especially at the 50 amps required to fully run the beasts. So, the hams built poorly regulated power supplies that made the simple MOPA designs chirp and yoop like hell. It was not the fault of the basic design, but it was the fault of poor ham mods, or attempts at it. Also, most folks seem to have forgotten that the QSK relay inside the rig sequentially keyed the rig and did a myriad of other functions to coordinate the antenna changeover in QSK. The two transmitters that I have had the fortune to own (a BC-191 and a BC-375) both had the QSK relays entirely out of sequence. That made them yoop like hell when first fired up. But, when the relays were properly sequenced, they both keyed and worked fine at speeds up to 35 wpm.

It is a real shame that most hams have taken such a fine and rock solid boatanchor and stripped it for parts..... Oh, well, good intentions based upon poor knowledge.....

>

> I'd kinda like to get hold of a BC-375 as a conversation piece, but NOBODY
> in his or her right mind would actually consider putting one on the air! To
> make this hog emit a legal signal you'd have to gut it and start over.

I have been running them rather satisfactorily for some 15 years now. Also, I ran a BC-375 on field day last year, to help our club commemorate the 60th anniversary of field day. From midnight to dawn, with a 400 volt dynamotor (I have never been able to find the real dynamotor for either of my beasts, so I have to cobble together what dynamotors I can), I made some 110 contacts. Noone seemed to know that the rig was a dinosaurian boatanchor of the first water.....

No modifications were required on either the BC-191 or the BC-375. It only needed to be properly set up by the manuals and properly tuned and operated.

>

> This one is an extreme case, but we've gotta realize something; it's been
> almost 50 YEARS since VJ Day! The world of communications has marched on since
> then, and so have the standards for what constitutes an acceptable signal.

No, my friend, you have to realise something. As I have pointed out to the CWISTS in the postings that have been floated about.....

..... remember, CW has not changed since the days of Valdemar Poulsen's arc or Dr. Alexanderson's alternators, or GE's early pliotrons.....

CW has not changed in signal specification in some 75+ years. Hence, the 60 year old design of the BC-191 or the BC-375 is entirely satisfactory, entirely within specification, and entirely usable.

The world of communications has, indeed marched along, but it has not changed in reality or principle. The technology has changed significantly, but, you know, even SSB was developed in the early 1920's (like about 1922, give or take one year) at the Bell labs. CW was developed in 1907, in Poulsen's lab in Denmark. AM was developed about 1905 or so, in Fessenden's lab. A 50 year old beast is surely satisfactory as a representative of either AM or CW, and if you heard either on the air, you would not be able to tell it from the average kenwoodie or yasewhooie that most folks run. It sounds just a little bit different, but most folks can't seem to tell you just how.....

The ONLY possible problem with the BC-191 and BC-375 transmitters is the meeting of the 30db spurious radiation specifications of Part 97. Properly tuned into a modern antenna tuner of PI design and run to a reasonable antenna, it will meet the specs. Improperly run into directly coupled antennas it might not meet the specs. I have not had a spectrum analyzer on mine, so I cannot say for sure how good or bad the beast is. If anyone has a spectrum analyzer they want to bring by for a test, kindly get in touch with me, and we will arrange a test.

>

> Many of the WW2 rigs ARE capable of a good, clean, stable signal, but most
> of them need some help and slight modernization.

Most are if you don't modify the hell out of them but DO take time to read the manuals, and run them properly within the design parameters. The only rigs that I know of that MUST have additional cleanup on the signals are 1) the SCR-506 transmitter and 2) the ART-13 transmitter, both of which use L network output circuits, and hence need additional output capacitors

to ground to make the L networks into PI networks. The ART-13 had a set of 3 outboard capacitors designed just for this particular problem. Also, since modern hams use 50 ohm antennas mostly, it is required to even allow the output tanks to properly load 50 ohm line.

>

> For example, I'm working on getting an ART-13 running right now; this is
> probably the best of the commonly available WW2 rigs.

Have you forgotten to load the tank with the output network capacitors? Usually an output capacitor of 300pf-500pf or more will provide you with the required impedance transformation and harmonic suppression. On 80 or 160 meters, up to 750pf-1000pf may be appropriate.

>

> As it stands, I'd be more than comfortable with running the rig stock... on
> AM only! To me, the stock rig is a disaster on CW; the internal keying relays
> won't key any faster than about 12 WPM (well, let's retire the Vibroplex, and
> use the J-38 with heavy leather flying gloves on!). Besides that, the cathode
> keyed VFO/PTO has a distinct tendency toward chirp and key clicks, especially
> on bands where the oscillator's frequency gets multiplied.

What about CW? It is a fine CW rig.

Proper relay sequencing again..... Check the specs, it will key nicely at 35wpm if properly set up.

>

> With a simple modification to grid block keying the PA, this box can stand
> up with the best of 'em today.

Granted, but if properly set up and run, you don't need to go to such extremes. It is a rig that is second to none of its era, and the many I have worked over the years put out very respectable signals. Just don't forget the pi net outboard harmonic suppression capacitance.

>

> I guess what it boils down to is that unless you're gonna put the rig on a
> shelf and just LOOK at it, you've GOTTA consider SOME level of modification!
> For most of us, I think, some measure of utility is the name of the game.

Modify as little as possible is USUALLY the best way to go. You often will have a hard time competing with designers that spent hundreds/thousands of hours designing the rig in the first place.

A few select mods may be appropriate, depending upon what you are trying to do, and what the rig actually is.

>
> As Jim pointed out, there are such large quantities of modern rigs (e.g.,
> R-390As) on the market that it's easy to deal with the modification question.
>
> Consider this tho; when I first started playing the surplus game, the stuff
> we consider rare today was a glut on the market, available for giveaway prices!
>
> We just recently heard about 600 bucks for an ART-13. I paid \$150 for one of
> mine. In 1965, you could get 'em NEW from dealers for under \$100, and on the
> hamfest circuit you could get a used one for \$10 or less!
>
> Remember the ARC-5 "Command Sets"? In '65, you could get the entire series,
> with accessories, for giveaway prices from the dealers, either new or used.
> Now, \$15 - \$20 is a pretty reasonable price for a decent transmitter, if you
> can find it, and receivers will run about the same or slightly higher.
>
> In 10 or 15 years, the commonly available R-390A will be a rare bird indeed,
> and will probably top \$1000 for the next generation of boatanchor lovers.
>
> My guess is that all we can do is enter the modification game thoughtfully,
> planning carefully before we so much as cut one wire. I try HARD to avoid the
> need to drill ANY new holes, and try to make internal mods obvious (different
> wire, resistors, and capacitors from the original) so that any future owner
> will have no problem telling what's new and what isn't, just in case s/he wants
> to restore it to original condition for whatever reason. Also, the level of
> modifiaction NEVER exceeds that necessary to make the rig useful.

Well said.

We all lament about the prices we pay for our toys, these days.....

Plan any mods carefully, and do only those really necessary.

Document all mods precisely.

>
> BTW, there is another matter to be considered here, and that is SAFETY! ANY
> rig hitting my shack that shows obvious hazards in it's design is gonna get a
> few modifications; NO rig is THAT sacrosanct!

PLEASE ALL THOSE ABOARD WHO ARE READING THIS:

BE VERY CAREFUL AROUND BOATANCHORS --- THE VOLTAGES IN ALL THE RIGS INCLUDING
THE RECEIVERS ARE DANGEROUS AND DEADLY TO YOUR PERSON. EXCERCISE EXTREME
CAUTION AT ALL TIME WHEN WORKING AROUND HIGH VOLTAGES IN BOATANCHOR GEAR.

>
> On the subject of safety, there's one hazard that a lot of the current gen-
> eration of boatanchor freeks aren't aware of.
>
> On SOME gear from WW2 it was standard procedure for the manufacturer to
> wire in small demolition charges near secret components (cavity magnetrons in
> 3 cm airborne radars), or in entire units of a sensitive nature (some types of
> crypto and IFF gear) to prevent them from being captured intact.
>
> I can't give you a detailed list of these sets, mainly because I don't know
> what they all are. I CAN tell you tho that I once encountered an early APX-6
> transponder that had some VERY odd looking "capacitors" in it!
>
> Luckily, this sort of thing wasn't used very often (thankfully), and IN
> THEORY it is removed from the gear before it is declared surplus (i.e., the
> gear gets "demilitarized").

Almost all HF gear that most folks will use should not have that problem.
Certain radars and secret specialty gear did have those demolition charges.
ALWAYS exercise caution around unknown pieces.

>
> Problem is that EVERYONE makes mistakes occasionally, and that includes the
> folks who did demilitarization. You'll probably never encounter one of these
> nasty little surprises, but be aware that the possibility exists!
>
>
> Mr. T., K9TA
>

Generally, well said, Mr. T.

I mean no flames at you about the BC-191/BC-375 gear, but that is one that
I do take extreme issue with, since I have been running these things since
my novice days, with only the highest praise for them.

Also, do use caution around unknown gear and around High Voltages,
all Boatanchorites!!!!

Aside from that, when do we get the boatanchors on the AIR?

Remember folks, the CWIST Friday Night Fist Function is an opportunity
for you to put your prized boatanchors ON THE AIR.

73 for now....

de NA4G
Boatanchor Bob.....

ps. Where's my flak suit Ma..... I feel a storm a'brewin' over Hamburg.....

```
*****
* 73 TU SU SK DE NA4G          ``Boat Anchor Bob'', an ol' CW fart. *
*****
* Morse has been in the family for over 100 years. *
* Morse radiotelegraphy (Spark/CW) has been in the family since 1914. *
*****
* May you have fair winds and following seas on your watch at the key. *
*****
```

From ab4el.com Tue Aug 9 00:00:00 1994
From: Jeff Jones <jeffj@crl.com>
Subject: Should the Nor. Cal. QRP Club do a QRP a field?

After reading about the exploits of the Zuni Loopers (who are my heros at the moment HI) why can't us at the NorCal club do the same on a fall weekend? Let's see 40 meters will be quieter (give those NorCal 40's a good workout), campgrounds will be emptier, it will be cooler and so on. Of course any and all QRPers would be welcome! Dare we hope that K5F0 will show up? 8-) Well what do you guys think??????

Jeff
AB6MB
jeffj@crl.com

From ab4el.com Tue Aug 9 00:00:00 1994
From: "SLRC1::M405142" <M405142%SLRC1.decnat@mdcgwy.mdc.com>
Subject: St. Louis QRP Society Meeting

The St. Louis QRP Society meets on the third Wednesday of each month at hte Florissant Valley Community College at 7:30PM in the Engineering Building on the second floor. Anyone with an interest in QRP, homebrewing, or having fun with Ham Radio is welcome to join us.

From ab4el.com Tue Aug 9 00:00:00 1994
From: bob.berlyn.303@chowda.com (Bob Berlyn)
Subject: TECK 'SCOPES

On 08-15-94 QRP@THINK.COM wrote to BOB BERLYN...

Q > Date: Mon, 15 Aug 94 14:55:46 -0400
Q > From: Bruce Robertson <brucerob@epas.utoronto.ca>
Q > To: qrp@Think.COM
Q > Subject: Teck 'scopes
Q >
Q > I have the chance to go halves on a Tecktronics 545B o-scope with type
Q > 1A1 dual trace plug-in unit. The price is \$75 (Can.) as is. Since the
Q > other party is very keen, I'm considering getting it just for the
Q > educational potential. However, since I know next to nothing about old

scopes, I'm wondering firstly if this is as good a deal as it seems and
secondly if there is any easy way to tell if the thing is working properly
and reasonably calibrated. It was used infrequently in a Library Science dept.

lab and has a sticker indicating that it was calibrated in 1969 (!).

Q > I appreciate your opinions on this,
Q > 72, VE3UWL
Q > Bruce G. Robertson Dept. of Classics, U. of T.
Q >

Bruce:

I have a Tecktronics 545A with a 1A1 dual trace unit. I traded two Boat
anchors for it. A Valliant (Not workig) and a Ranger (that worked well).
I am not really sure what the scope is worth but I get the impression
not much. I looked at the price of new compatable scopes and thought
I made a reasonably good deal. I use the scope to help figure out why
my QRP projects dont work after I get done with them. (well not all of them)

I am happy with it, but it sure is BIG and HEAVY, I have a wheeled stand
with mine. It has built in calabration circute so I would not think
that would be a problem.

I am not sure what the difference is between the A and B but
I have all the manuals for the A and the 1A1 plug in, so if I can be any
help in that department let me know.

- - - -

* OFFLINE 1.54 * Bob Berlyn N1PWU

Bob.Berlyn@Chowda.com

From ab4el.com Tue Aug 9 00:00:00 1994
From: Greg Buhyoff <BUHYOFF@VTVM1.CC.VT.EDU>

Subject: TS 50 for sale

I have a new (used about an hour) TS 50 with the optional 500HZ CW filter installed. Can easily be cranked down to QRP levels. Perfect condition, original box, manual, mic etc. that came with the rig. Will ship UPS insured for \$775.

Greg Buhyoff KN4FR

From ab4el.com Tue Aug 9 00:00:00 1994
From: Brad Mitchell <bmitchel@CBA.Kodak.COM>
Subject: Ten Tec PM3A

Hi all, after recently acquiring the Ten Tec PM3A, I decided to start doing a little background check on these rigs. I put a posting to Packet (ugh) , and got several responses. Most of them seem to have confirmed what I've been told so far here, that the PM3A was introduced somewhere between 1972 and 1973.

The thing that I'm a little unclear about is, what was the first rig that Ten Tec produced? Was it the PM1??

If so , why is there little interest in these rigs compared to the HW7,8,9 series?? was it that the HW was just so much more popular, or is it the dead artist syndrome with Heathkit?

One of the responses to my packet posting was a note from a fellow that has the original release stuff on the PM3A. Apparantly he wrote for it from Ten Tec, and he has that in his posession. He said he would send me a copy if I paid him a \$1.00 for copy cost. That seems awfully nice to me, so I'm going to try to get that copied.
73 all, Brad WB8YGG

From ab4el.com Tue Aug 9 00:00:00 1994
From: prvalko <prvalko@vela.acs.oakland.edu>
Subject: Re: Ten Tec PM3A

Brad, et al:

I have some of that original documentation, errr copies of it, that is :-)

As the self-proclaimed president of the PowerMite fan club, I also welcome all comments and suggestions and offers to SELL these fine examples of Ham Radio history.

73, =paul= wb8zjl

Owner of PM-1 PM-2 and two PM-3a

From ab4el.com Tue Aug 9 00:00:00 1994
From: xenolith@halcyon.com (Kevin Purcell)
Subject: Re: Ten Tec PM3A

>Hi all, after recently acquiring the Ten Tec PM3A, I decided to start doing a
>little background check on these rigs. I put a posting to
>Packet (ugh) , and got several responses. Most of them seem to have
>confirmed what I've been told so far here, that the PM3A was introduced
>somewhere between 1972 and 1973.

>
> The thing that I'm a little unclear about
>is, what was the first rig that Ten Tec produced? Was it the PM1??

>
>If so , why is there little interest in these rigs compared to the HW7,8,9
>series?? was it that the HW was just so much more popular, or is it the
>dead artist syndrome with Heathkit?

>
>One of the responses to my packet posting was a note from a fellow that
>has the original release stuff on the PM3A. Apparently he wrote for it
>from Ten Tec, and he has that in his possession. He said he would send
>me a copy if I paid him a \$1.00 for copy cost. That seems awfully nice
>to me, so I'm going to try to get that copied.
>73 all, Brad WB8YGG

The PM series design is about as good (as bad) as the HW-7 which we all
know makes a great SWL rig (it detects AM soooo well!).

Both the HW-8 and HW-9 are in a different league (though they have their
own little problems).

I'm a HW-7, 8, 9 owner.

I do think that for historical value the PM rigs are worth it. One local
has one he keeps for show and tell and its in very nice condition. A
working one would be even better!

Most amazing of all is to read the early Ade Weiss QRPP columns in the
through the 1970s and to see what people did with the PM series and the
HW-7!

72/73

Kevin Purcell, N7WIM / G8UDP
Seattle dBug Mac Developers SIG leader
xenolith@halcyon.com

From ab4el.com Tue Aug 9 00:00:00 1994
From: Robert Cutter <bcutter@csn.org>
Subject: TenTec E-Mail

Is there an E-mail address for TenTec? I am awaiting a 6m. kit.

72, Bob KI0G

From ab4el.com Tue Aug 9 00:00:00 1994
From: bruce.florip@amail.amdahl.com
Subject: Think.com status...

Just wanted to pass along this press release, and thank Bruce (WT1M) for all of his time and efforts supporting the QRP community. Bruce (AA7AR/6)

THINKING MACHINES Corp., the pioneer in massively parallel supercomputers, has announced that it plans to seek Chapter 11 bankruptcy-court protection from its creditors. The company also announced that it will continue to provide services to existing customers, mostly in government agencies and the oil industry, but plans to reduce its work force by one-third (it currently has 425 employees). Thinking Machines is expected to file Chapter 11 by the end of the week and will use the court protection to refocus its business. The company hopes to license its technology to other companies. (Wall Street Journal - 8/17/94)

From ab4el.com Tue Aug 9 00:00:00 1994
From: N100Q Tom R. @ MR01 18-Aug-1994 0943 <randolph@est.enet.dec.com>
Subject: VFO drift questions

I'm building a 40m copy of W1FB's "universal VFO" as seen in QRP Notebook. I have the actual oscillator itself running, no buffer stages yet. About

how much drift can I expect out of one of these before I get it closed up in some kind of box? I found that I can blow on it and get it to drift by a couple of hundred Hz, presumably due to cooling/heating...

Description for those without the book: Hartley osc., #6 material toriod and NP0 caps, MPF102 JFET with 9V supply regulated by a Zener. I cheated a bit and used a cheapo trimmer cap in the osc. (Mouser's "6mm snap-in mount", listed as N750). Should I fork over the \$3 for the air trimmer?

- -Tom R. N100Q randolph@est.enet.dec.com

From ab4el.com Tue Aug 9 00:00:00 1994
From: "John F. Woods" <jfw@ksr.com>
Subject: Re: VFO drift questions

> I'm building a 40m copy of W1FB's "universal VFO" as seen in QRP Notebook.
> I have the actual oscillator itself running, no buffer stages yet. About
> how much drift can I expect out of one of these before I get it closed up
> in some kind of box? I found that I can blow on it and get it to drift by
> a couple of hundred Hz, presumably due to cooling/heating...

Ayup. The "Universal VFO" is supposed to be quite stable, but as with any VFO, you need to attend to lots of details to achieve the minimum drift.

> Description for those without the book: Hartley osc., #6 material toriod
> and NP0 caps, MPF102 JFET with 9V supply regulated by a Zener. I cheated a
> bit and used a cheapo trimmer cap in the osc. (Mouser's "6mm snap-in mount",
> listed as N750). Should I fork over the \$3 for the air trimmer?

Yes. Alternatively, if you have them, you might experiment with polystyrene capacitors, which have a positive tempco to balance the toroid's (and trimcap's) negative tempco. If the trimmer is 5% of the total capacitance, then all else being equal (or all else being NP0 :-) you'll see 38PPM drift per degree C, which at 7MHz is 266 cycles. (Of course, the toroid material itself is 35ppm(?), so you want to keep the temperature as stable as you can anyway (hence the box).)

From ab4el.com Tue Aug 9 00:00:00 1994
From: adams@chuck.dallas.sgi.com (chuck adams)
Subject: W1FMR et al

Note that Jim, W1FMR, announced the group for Salisbury Beach MA operation. NOTE: no map or address!! Is the place that small that you guys/girls can easily be located

on the beach?

Inquiring minds wanna know. I'll be on 20M with either a 600' V beam aimed in your direction or Yagi pointed in that direction. Hoping for "FlagPole Hill" here in Dallas. We'll see what the NorTex group is gonna do at next meeting in Sept.

dit dit es gl n tst,

Chuck Adams K5FO CP-60
adams@sgi.com

From ab4el.com Tue Aug 9 00:00:00 1994
From: william.redfearn.cmwdrr01@nt.com
Subject: Want dead HF rig

Looking for late model HF rig (WARC) with blown finals for a QRP project. Especially interested in FT-707, IC-735, TS-530s, FT-101ZD, or any TEN-TEC rigs.
73-Dave.

=====
Dave Redfearn, SR PC LAN Analyst Northern Telecom RTP, NC.
ph.(919) 992-3925 email: cmwdrr01@nt.com qrl? de N4ELM/qrp

All opinions are my own and do not necessarily reflect the views of my employer, co-workers or any other person, real or imaginary.

From ab4el.com Tue Aug 9 00:00:00 1994
From: "Judy L. Schnabolk" <73043.1704@compuserve.com>
Subject: Yaesu FT-7 SSB/CW QRP XCVR

Yaesu FT-7 SSB/CW 10W PEP transceiver. Covers 5 bands (80 - 10M) with 1 KHz frequency readout, RIT, noise blanker, semi-breakin keying w/ sidetone, pre-mixed VFO for stability and low phase noise, 2 cascaded filters in IF and broad band push pull power amp. using MRF433's).

Near mint condition w/ microphone, DC power cable and manual. \$375 + ship

Contact via email "73043.1704@COMPUSERVE.COM" or (617) 631-8383.

From ab4el.com Tue Aug 9 00:00:00 1994
From: rdkeys@csemail.cropsci.ncsu.edu (R. D. Keys)
Subject: [none]

OK, folks, here is the weekly posting for the CWISTS.....

Because of certain net folk not wishing to see this posting repeatedly, make sure you make a copy of it for reference. I will post only short form announcements from this time on.

This time we are going to try a departure from the normal for the CWISTS.

First, I am recommending that each time zone meet at midnight local time rather than one time at 0400UTC. This will hopefully spread the load out across the country and around the world, so all hands aboard can find some CWISTS to QSO somewhere. This will also allow some folks who are not used to being up late pounding brass to check in an hour or two earlier from the western edge of the propagation.

Second, I am going to QSY this week to 40 meters from 80 meters to see if we can pick up a few additional folks on the 40 meter QRG. I will keep the main rig on the 80 meter QRG in case someone tries that, starting at 30 minutes past the midnight hour.

SU THERE OM/YL AND ALL HANDS ARE WELCOME TO JOIN IN ON THE FUN

Bob
NA4G

QST QST QST CQ CQ DE NA4G NA4G NA4G BT
1615330UTC AUG 94
FM NA4G

TO ALL CW OPS WORLDWIDE BT
CWIST FRIDAY NIGHT FIST FUNCTION.

ALL HANDS QSW/QSX 3702.5/7102.5KHZ MIDNIGHT LOCAL TIME FRIDAY NIGHT.
GET ON THE AIR AND ENJOY A PLAIN CW EVENING ON THE 40/80 METER BANDS.
USE A REAL HAND KEY (A STRAIGHT SENDING IRON OR BUG IS ENCOURAGED).
A VERY SIMPLE VERY INFORMAL NET STYLE FORMAT WILL BE UTILIZED.
WHEN THE CONTROL STATION INVITES CHECKINS, CALL CWIST DE YOURCALL K.

YOU WILL BE ACKNOWLEDGED AND PLACED IN LINE FOR YOUR COMMENTS.
IF NO NET CONTROL IS ABOARD THEN SIMPLY START THE CALL YOURSELF.
ENJOY OLD-TIME AMATEUR RADIO AND TRY SOME FRIENDLY BRASS POUNDING.
EXCHANGE MORE THAN RST QTH NAME HELLO AND GOODBYE.
HELP ALONG THE NEW HAMS ON CW TO GET THEIR SPEED UP.
TELL A FAIR YARN OR TWO AMONG FELLOW CWISTS AND RAGCHEW A LITTLE WHILE.
TELL SOME HISTORY ABOUT THE OLD-TIME DAYS AND YOUR EXPERIENCES IN RADIO.
IF YOU ARE AN OLD TIMER PLEASE JOIN IN AND SHARE YOUR EXPERIENCES.
IF YOU WERE EVER A PROFESSIONAL PLEASE JOIN IN AND SHARE YOUR EXPERIENCES.
USE BOATANCHOR GEAR IF YOU HAVE IT AVAILABLE OR WHATEVER YOU HAVE.
SEE YOU THERE OM/YL.
73 TU SU DE NA4G BOB AR

Greetings CWISTS, Boatanchorites, QRPites, Fellow Hams, et al:

I will be on again at the appointed midnight hour for the continuing saga of the Sacred and Most Honorable Friendly Society of Brass Pounding Fist Functioning CWISTS.

THE APPOINTED TIME IS CHANGED TO MIDNIGHT LOCAL TIME.

THE PRIMARY QRG IS 40 METERS (7102.5 KHZ) THIS COMING FRIDAY NIGHT.

THE ALTERNATE QRG IS 80 METERS (3702.5 KHZ) THIS COMING FRIDAY NIGHT.

There has been a lot of interest on the rec.amateur.radio newsgroups on sending CW and the general poor quality of many fists these days. Let us do a little to promote, not only the art of receiving CW radiotelegraphic communication, but also the art of ...sending... good CW radiotelegraphic communication. It is perfectly fine to have an individualized fist, and it is often easy to tell who is aboard on watch at the key, just by the first few characters received, but it ...should... be a point of pride and operating skill to be able to manually send characters of sufficient integrity as to be readily received by all who might be in a position to hear same.

So, let us all see who will be on watch this coming friday night (saturday morn 0400UTC). Run your treasured boatanchor if you can, or even that newfangled rice box supreme, or even that fine homebrew QRP rig.

Definition: A CWIST is a person with an active interest in the PRACTICE and USE of continuous wave radiotelegraphy as directly is appliccable to amateur radio. Such PRACTICE and USE may take the form of learning about radiotelegraphy and its history in amateur/commercial areas, its application to radio

telecommunication, the practicing of the art and craft of radiotelegraphy, and the refining and developing of the technology of radiotelegraphy.

The general information is:

```
+++++
+          CWISTS Friday Night Fist Function          +
+++++
+
+ Standard time:  Friday Nights at MIDNIGHT LOCAL TIME      +
+
+ Standard freq:  80 meters --- 3702.5 khz for all hands.    +
+                 40 meters --- 7102.5 khz alternate, for all hands +
+                 (between the heterodynes)                  +
+                 (someone scout out a better QRG)           +
+
+ Standard calling signal:  ---                               +
+                           CWIST IMI DE <yourcall> K (if there +
+                           are no control stations calling for +
+                           you to check in), or,              +
+                           CWIST DE <yourcall> K (if there is a +
+                           control station inviting checkins) +
+                           (The alternative check in for those OTs +
+                           with salt behind the ears is a simple +
+                           DE to get the control station's ears +
+                           followed by DE <yourcall> K when the +
+                           control station acknowledges.)      +
+
+ Note:  A simple informal net style protocol will generally be +
+        used, unless no control station assumes control for the +
+        evening, in which case it is an open roundtable format +
+        discussion group.
+
+ Note:  The midnight local time gathering is designed to maximize +
+        the number of checkins spread out over the world, so less +
+        confusion and more checkins are heard.  The hope is that +
+        someone will be aboard almost anywhere and be heard at +
+        least locally, anywhere in the world.
+
+++++
```

Let us all work together to continue to advance and promote the friendly use of CW on the amateur radio bands.

Let us continue to assist and help the newcomers and slowspeeds who are trying to get their CW going.

Let us to continue to promote the use of whatever gear you have up and available, be it the newest of sorts or the oldest boatanchor. Remember, CW generation has not changed since the days of Poulsen arcs, Alexanderson alternators, and Pliotrons.

Let us continue to promote the sharing and fellowship of the history and traditions of amateur radio (this includes all you OTs out there that have all sorts of goodly tidbits of history to relate to the young squirts on the block, and it includes all you young squirts on the block who, even though a bit new at CW and radio are the future of the service or hobby or profession).

Let us continue to promote the ``elmering'' of all of our new folks by the old timers aboard, in any way that we can. We should not be out to convert the brethren to CW, but should be there to elmer them and assist them in learning/practicing their skills, if possible.

So, OTs aboard, young squirts in the wings, high-speed aficionados of the art, and slow-speed ragchewers, join in on the fun. If your equipment is old boatanchor, so what. If your signal is a bit weak or chirpy, so what. If your antenna is just a mere piece of wire up into the trees, so what. YOU can still join in and participate. YOU are the folks who will make it what it can be, a goodly learning time and an enjoyable evening for all.

See You There OM/YL.....

73 TU SU SK DE NA4G
Bob

* May you have fair winds and following seas on your watch at the key. *

From ab4el.com Tue Aug 9 00:00:00 1994
From: Bruce Walker <bruce@Think.COM>
Subject: still here for now...

If you follow the computer industry in the papers you probably have heard that my employer, Thinking Machines (a.k.a. Think.COM), yesterday announced filing for chapter 11 protection and an immediate layoff of about 1/3 of its employees. Another large group of employees are "in transition"; meaning that they represent technologies which the company is trying to

sell or license over the next several weeks. A core group of people will remain to turn the business around. I am in the middle category, which means that I still have a job here now, but one way or another, I will be somewhere else within a few weeks.

My absense from both the list and from being on the air the past many months are because I was totally consumed trying to prevent it from coming to this. My heart and soul are in this place; I've been here since the beginning (almost), and it's been a wonderful ride.

This has nothing to do with QRP, but it has lots to do with the QRP list. This company has always been generous about the use of its resources to further non-work-related causes, particular in respect to being a valuable resource in the Internet and Usenet communities. I hope that attitude will continue, but since I won't be here for long (and I am the last QRPer here), I do now need to find a new home and administrator for this list.

My personal situation requires me to focus on creating a new future for myself and the group of people who work for me. Thus, I will be unable to offer much assistance or advice toward getting the list moved other than turning over the list of recipients to someone, so anyone experienced at maintaining Internet mailing lists would be most valuable.

Carry on.

- --bruce WT1M

P.S.--We were off the Internet for 24 hours from Sunday night to Monday night as part of the logistics of carrying out this RIF. Apologies if this caused loss of mail on the list.

From ab4el.com Tue Aug 9 00:00:00 1994
From: meh@cbsms1.cb.att.com (m.e.hartwell)
Subject: vfo use

Hello all

Well as luck would have it I am now a proud owner of a Ten Tec VFO. Now what do I do with the thing? I don't have any transmitters that require a vfo, I may in the future but not now. I was wondering if I could use it by itself as a qrp transmitter, what do you think? Maybe build up a tank circuit to match the high impedance output of the vfo to low 50 ohm impedance of the antenna and run that through a tr switch with a receiver. The vfo coverers 80 and 40 meters directly and multi's up for the rest of the 20, 15, 10 meter bands.

Any comments?

Marty kd8bj

From ab4el.com Tue Aug 9 00:00:00 1994
From: "Stan Goldstein, N6ULU" <stan@cruzio.com>
Subject: Re: vfo use

m.e.hartwell writes:

>
> Hello all
>
> Well as luck would have it I am now a proud owner of a Ten Tec
> VFO. Now what do I do with the thing? I don't have any transmitters
> that require a vfo, I may in the future but not now. I was wondering
> if I could use it by itself as a qrp transmitter, what do you think?
> Maybe build up a tank circuit to match the high impedance output of the
> vfo to low 50 ohm impedance of the antenna and run that through a tr
> switch with a receiver. The vfo covers 80 and 40 meters directly and
> multi's up for the rest of the 20, 15, 10 meter bands.
>
> Any comments?
>
> Marty kd8bj
>

Sounds like something that would be ideal to hook up to an r1 or r2
board. That plus a switchable front end would make a great multiband
rig for the r1.

- --
Stan Goldstein , N6ULU
